

Figure 1

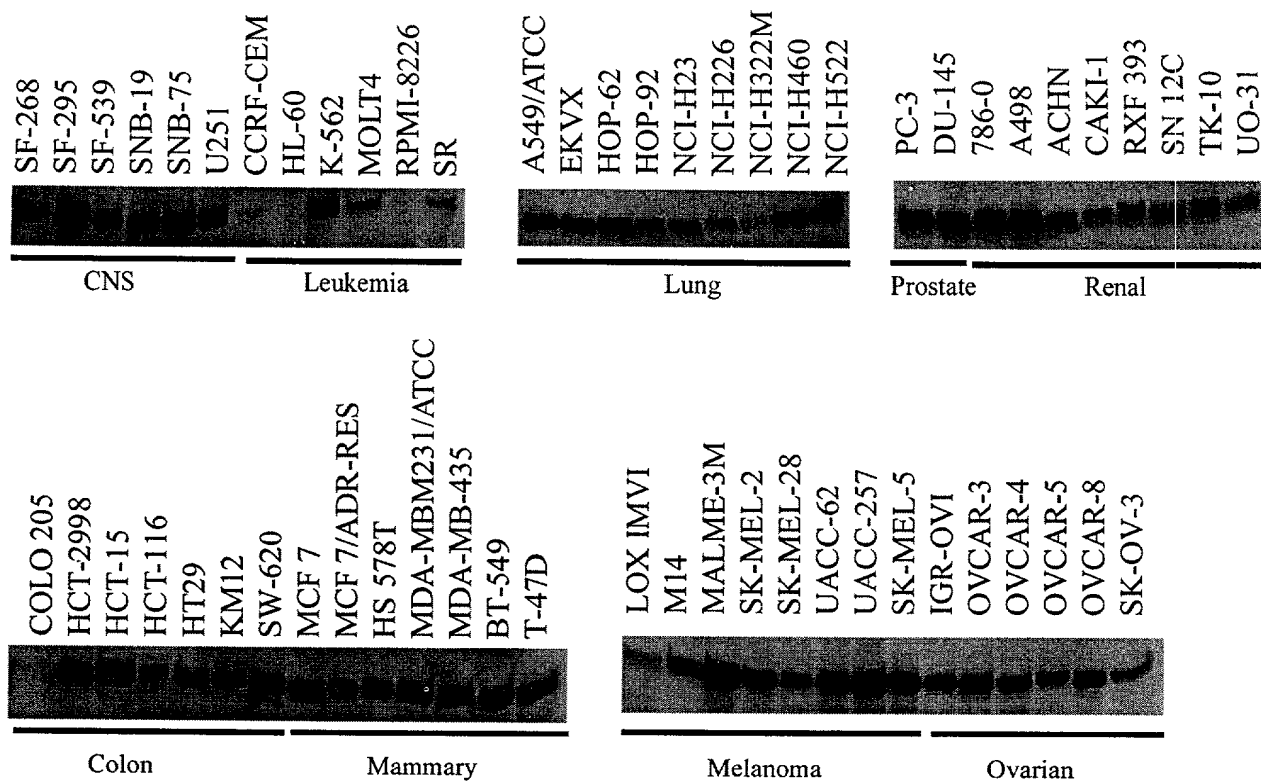
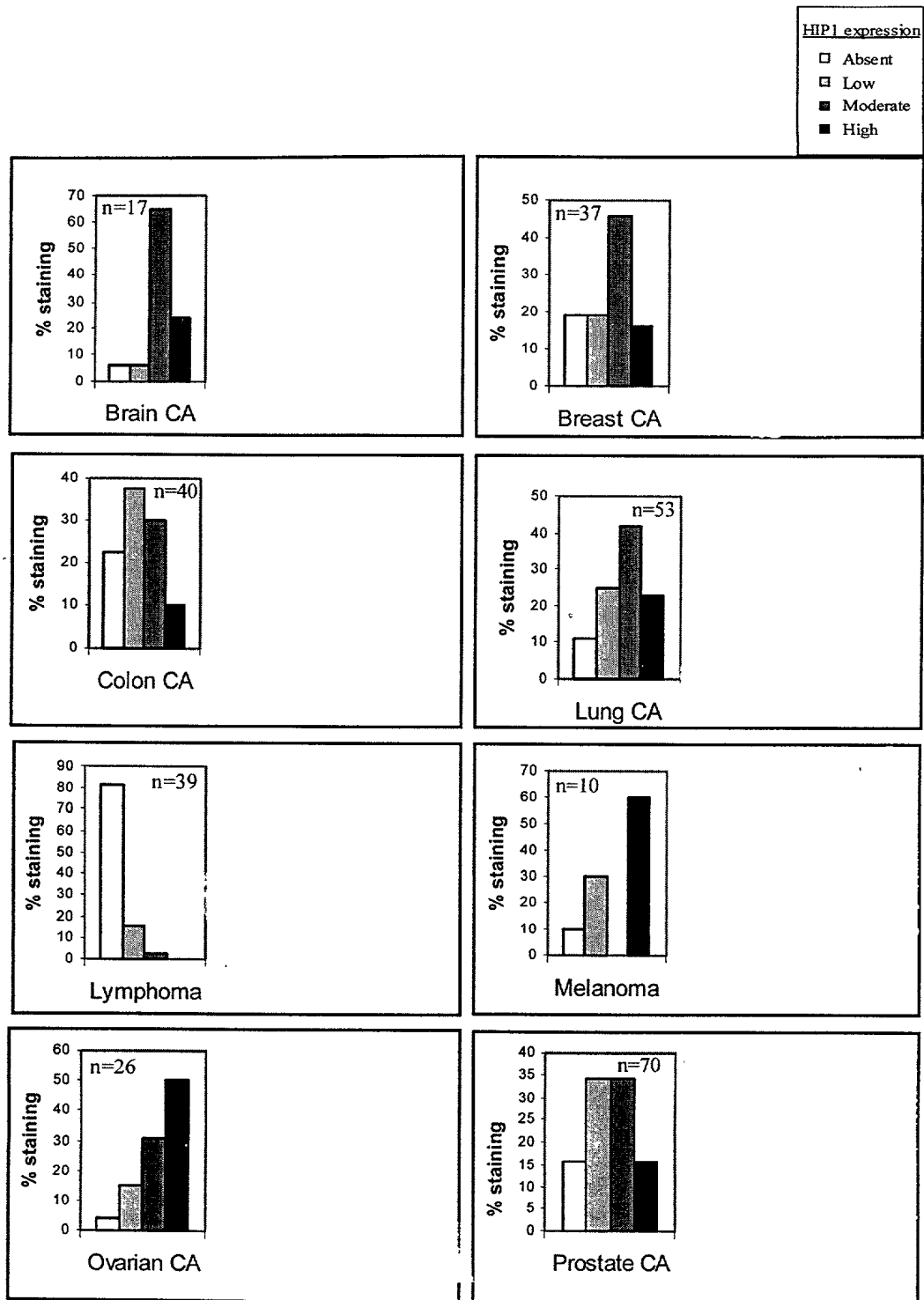
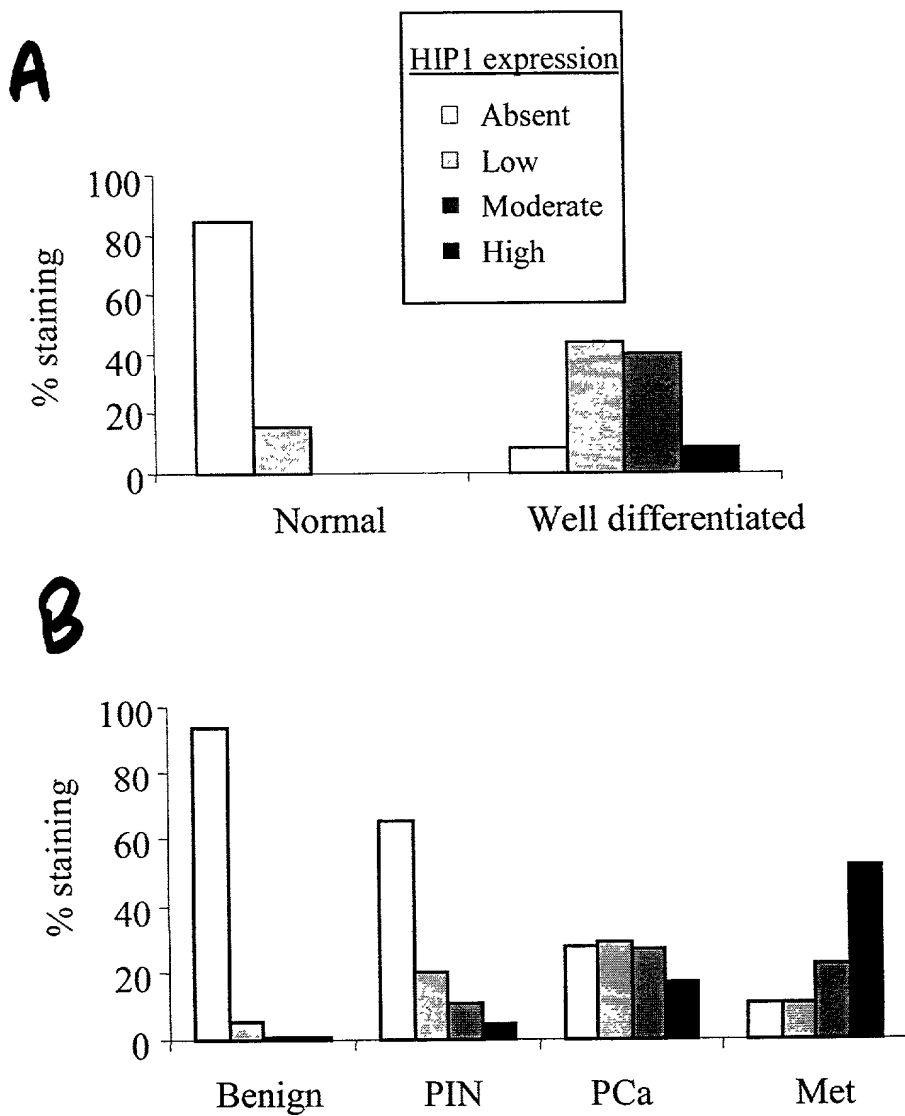


Figure 2

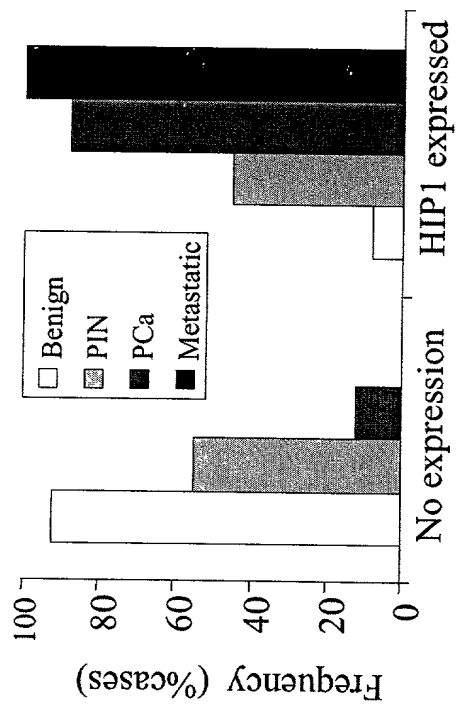


2

Figure 3



a.



b.

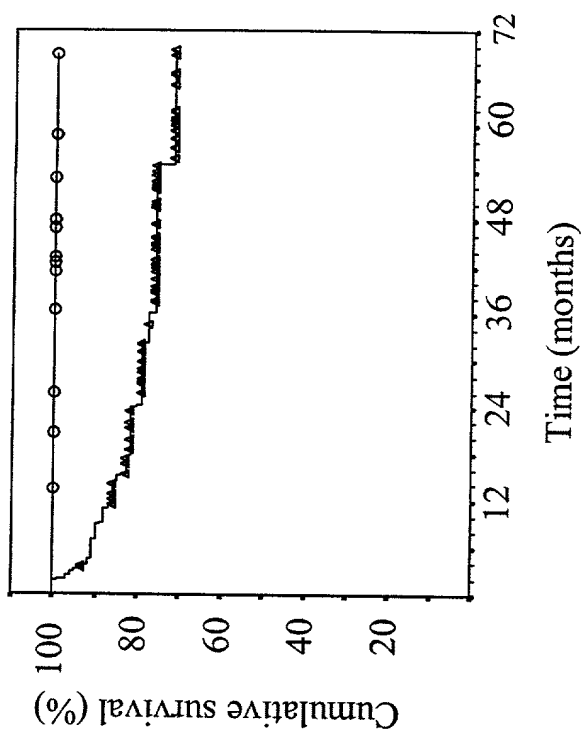


Figure 4

Figure 5

		HIP1 expression				Total
		Absent	Low	Moderate	High	
ID #	21	6				6
	22		2			2
	23	1	1	1		3
	25	1	3			4
	26		2	1		3
	31			3	1	4
	32		1	2	1	4
	33				2	2
	38	1		1	4	6
	43		2	2	1	5
	44	2	2			4
	45		2			2
	53		1	2	1	4
	56			2		2
	58			3	1	4
	62	1		1	2	4
	63			5	1	6
	65	1	1	1	2	5
	66	1	1	1		3
	67	2	1		1	4
	70	2	1	2		5
	73		1	6		7
	75	2				2
	76	1	3	1		5
	77	3	1			4
	78	1	2			3
	82	1	2			3
	83	1	1	1	3	6
	84	2	1	1	2	6
	85	1	3	1		5
	89	1	1	3	1	6
	91			4		4
	92	1	1	1		3
	93		1	2	2	5
	96	2	1	1	2	6
	97	1	2	1		4
	99			2	2	4
	101		2	4		6
	102	4			1	5
	103		4			4
	105		2	1		3
	106	1	1		1	3
	108		1	2	3	6
	109		1	5		6
	110	3				3
	111	4	1			5
	113	2		2		4
	114	2				2
	115				2	2
	117			2		2

		HIP1 expression				Total
		Absent	Low	Moderate	High	
ID #	118		1	3		4
	119		2	3	2	7
	123	3	3	1		7
	125	4	2			6
	127	3	1			4
	128			1	3	4
	129	3	1			4
	131	1	1			2
	132			3	1	4
	141			2	2	4
	142	2	3			5
	144	1	3	2	1	7
	145	2				2
	153		1	1		2
	154	2				2
	155				4	4
	159	4	2			6
	161	2				2
	162	1	1	1		3
	164			1	3	4
	165		4	2		6
	169		2			2
	170	3	2	1		6
	171			2		2
	172	2				2
	173	3		1		4
	175	3				3
	177	4	2			6
	178	2	1			3
	179	3	1			4
	180	1			3	4
	181	4				4
	182	2				2
	183		2			2
	186		4			4
	194	4	1			5
	194	2	1			3
	195	1	5	1		7
	199		1	1	1	3
	204		3	1		4
	205			2	2	4
	206		6			6
	207		4			4
	208			3	1	4
	209			2	3	5
	212	1	4	1	3	9
	213	2	3	2		7
	214		1	1	3	5
	217		1	2	3	6
	218	1	6			7

5

		HIP1 expression				Total
		Absent	Low	Moderate	High	
ID #	220		1		5	6
	225		1	3		4
	228			3		3
	229	1		2	1	4
	230	2				2
	231			2	1	3
	234			2		2
	235		3	1		4
	236	2	3			5
	237	4	1			5
	238	2				2
	239		3	2		5
	241	2	1	1		4
	248			2		2
TOTAL		128	136	123	76	463

100470001

**A**

TRAMP mice

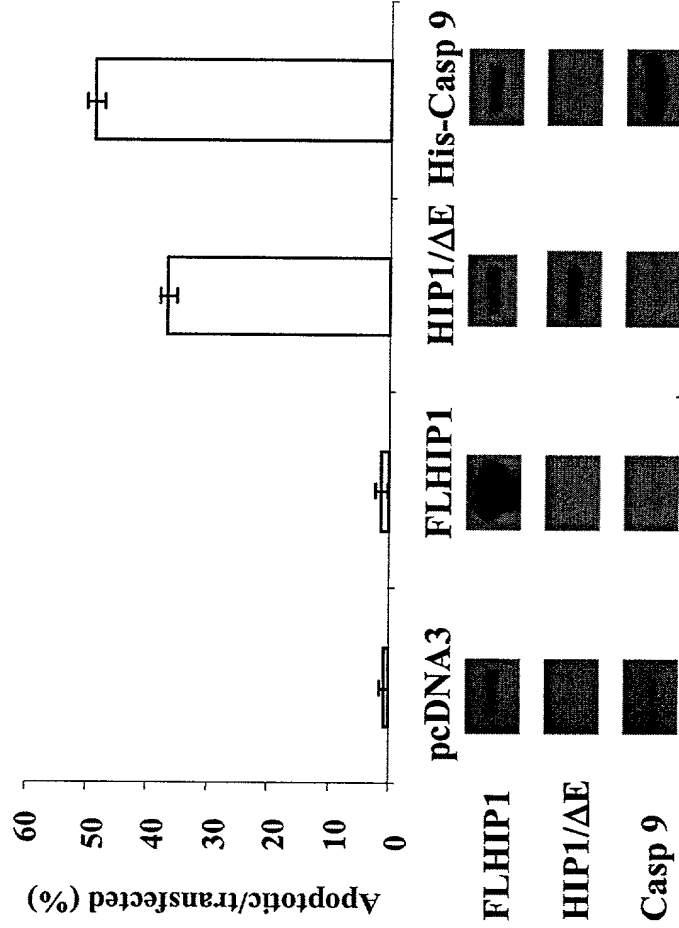
Figure 6

Prostate Tissue:

Pca 1  
Pca 2  
Pca 3  
Pca 4  
Pca 5  
Pca 6  
Pca 7  
Pca 8  
Pca 9  
Pca 10



**B**



**Figure 7**  
**Full length HIP1 (SEQ ID NO:1)**

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109067 4702007

## Figure 8

### Full length HIP1 (SEQ ID NO:2)

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MARQAQVDLEREKKELEDSELRISDQGQRKTQEQLVLESLSKQELATSQRELQVLQGSLETSQAQSEANWAA  
EFAELEKERDSLVSAGAAHREEELSALRKELQDTQLKLASTEESMCQLAKDQRKMLLVGSRKAAEQVIQDAL  
NQLEEPPLISCAGSADHLLSTVTSISSCIEQLEKSWSQYLACPEDISGLLHSITLLAHLTSDAIAHGATTC  
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PWSPRGSHTTAITQCRGHA\*HFQRLPP\*RHPFCLDPWISTASYGGWLGFLVLFKKFHSLSQLSQRHPW  
G\*VSRAPQLW\*LQRWCCPGLSVLHLRLHTDQVLAHPVHAPGSGGAAE\*QLSSKSRRRVSAFPS\*S\*IPAES  
LCPPLQGRRQKEGQEGSHSPVPVTRLKNLITCLNGAGEINNTSLPE\*TVREWSLSSGPSPLAQRRSVGV  
IPNSFLQTSALASS\*IGRSFHLLRN\*QTRKIRCNCSEQRTLYLVCYP\*YLLLTSLKQQOPTKRCLEQSEL  
QV\*L\*QSSSFCPATSAFKNQKKQGAGLLLTWIPKQGDHLELLGQRK\*ERTEPAAPTFFSHMPQALAALWT  
G\*QGRAHEQLARDGQPNSTFPLLDGPHLSDLLILGKQRLPSLSIATHWW\*PSSTSEFLQPGRPLEHAXEG  
P

(\* are stop sequences)

## Figure 9

### Delta ENTH (SEQ ID NO:3)

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10904-4904

Variable	Mean	Standard Deviation	Minimum	Maximum
Age	38.5	12.5	25	65
Gender	0.5	0.5	0	1
Marital Status	0.7	0.5	0	1
Education	12.5	2.5	9	16
Income	35000	15000	10000	70000
Health	0.8	0.4	0	1
Exercise	0.3	0.5	0	1
Stress	0.6	0.5	0	1
Depression	0.2	0.4	0	1
Loneliness	0.4	0.5	0	1
Social Support	0.7	0.5	0	1
Life Satisfaction	0.6	0.5	0	1
Resilience	0.5	0.5	0	1
Optimism	0.6	0.5	0	1
Gratitude	0.7	0.5	0	1
Forgiveness	0.6	0.5	0	1
Compassion	0.5	0.5	0	1
Kindness	0.6	0.5	0	1
Generosity	0.5	0.5	0	1
Humility	0.6	0.5	0	1
Patience	0.5	0.5	0	1
Self-control	0.6	0.5	0	1
Perseverance	0.5	0.5	0	1
Determination	0.6	0.5	0	1
Courage	0.5	0.5	0	1
Confidence	0.6	0.5	0	1
Trust	0.5	0.5	0	1
Respect	0.6	0.5	0	1
Responsibility	0.5	0.5	0	1
Integrity	0.6	0.5	0	1
Honesty	0.5	0.5	0	1
Modesty	0.6	0.5	0	1
Politeness	0.5	0.5	0	1
Courtesy	0.6	0.5	0	1
Grace	0.5	0.5	0	1
Charm	0.6	0.5	0	1
Wit	0.5	0.5	0	1
Humor	0.6	0.5	0	1
Kindness	0.5	0.5	0	1
Generosity	0.6	0.5	0	1
Humility	0.5	0.5	0	1
Patience	0.6	0.5	0	1
Self-control	0.5	0.5	0	1
Perseverance	0.6	0.5	0	1
Determination	0.5	0.5	0	1
Courage	0.6	0.5	0	1
Confidence	0.5	0.5	0	1
Trust	0.6	0.5	0	1
Respect	0.5	0.5	0	1
Responsibility	0.6	0.5	0	1
Integrity	0.5	0.5	0	1
Honesty	0.6	0.5	0	1
Modesty	0.5	0.5	0	1
Politeness	0.6	0.5	0	1
Courtesy	0.5	0.5	0	1
Grace	0.6	0.5	0	1
Charm	0.5	0.5	0	1
Wit	0.6	0.5	0	1
Humor	0.5	0.5	0	1
Kindness	0.6	0.5	0	1
Generosity	0.5	0.5	0	1
Humility	0.6	0.5	0	1
Patience	0.5	0.5	0	1
Self-control	0.6	0.5	0	1
Perseverance	0.5	0.5	0	1
Determination	0.6	0.5	0	1
Courage	0.5	0.5	0	1
Confidence	0.6	0.5	0	1
Trust	0.5	0.5	0	1
Respect	0.6	0.5	0	1
Responsibility	0.5	0.5	0	1
Integrity	0.6	0.5	0	1
Honesty	0.5	0.5	0	1
Modesty	0.6	0.5	0	1
Politeness	0.5	0.5	0	1
Courtesy	0.6	0.5	0	1
Grace	0.5	0.5	0	1
Charm	0.6	0.5	0	1
Wit	0.5	0.5	0	1
Humor	0.6	0.5	0	1
Kindness	0.5	0.5	0	1
Generosity	0.6	0.5	0	1
Humility	0.5	0.5	0	1
Patience	0.6	0.5	0	1
Self-control	0.5	0.5	0	1
Perseverance	0.6	0.5</		

(\* are stop sequences)

h1

Figure 11

# Domain Structure of HIP1

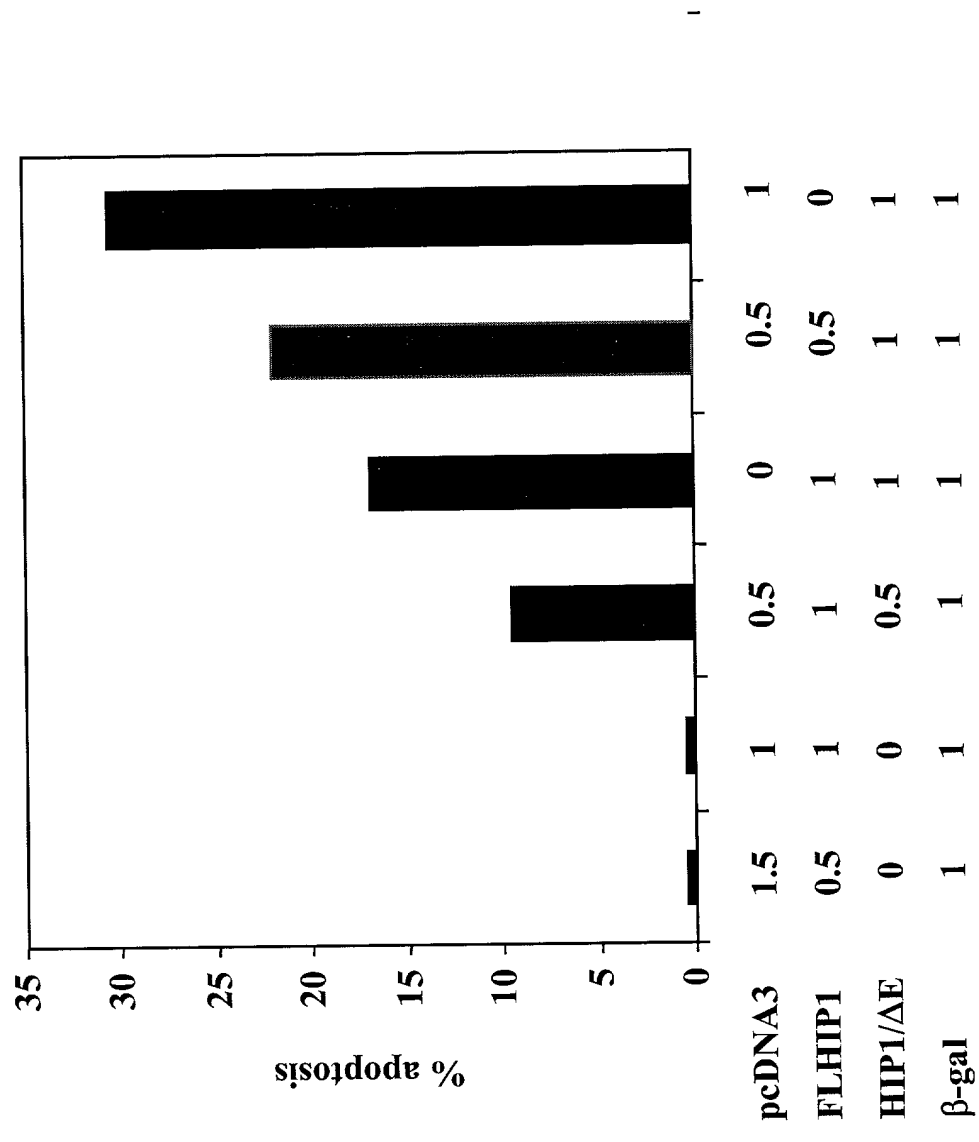


51

Post-transfection

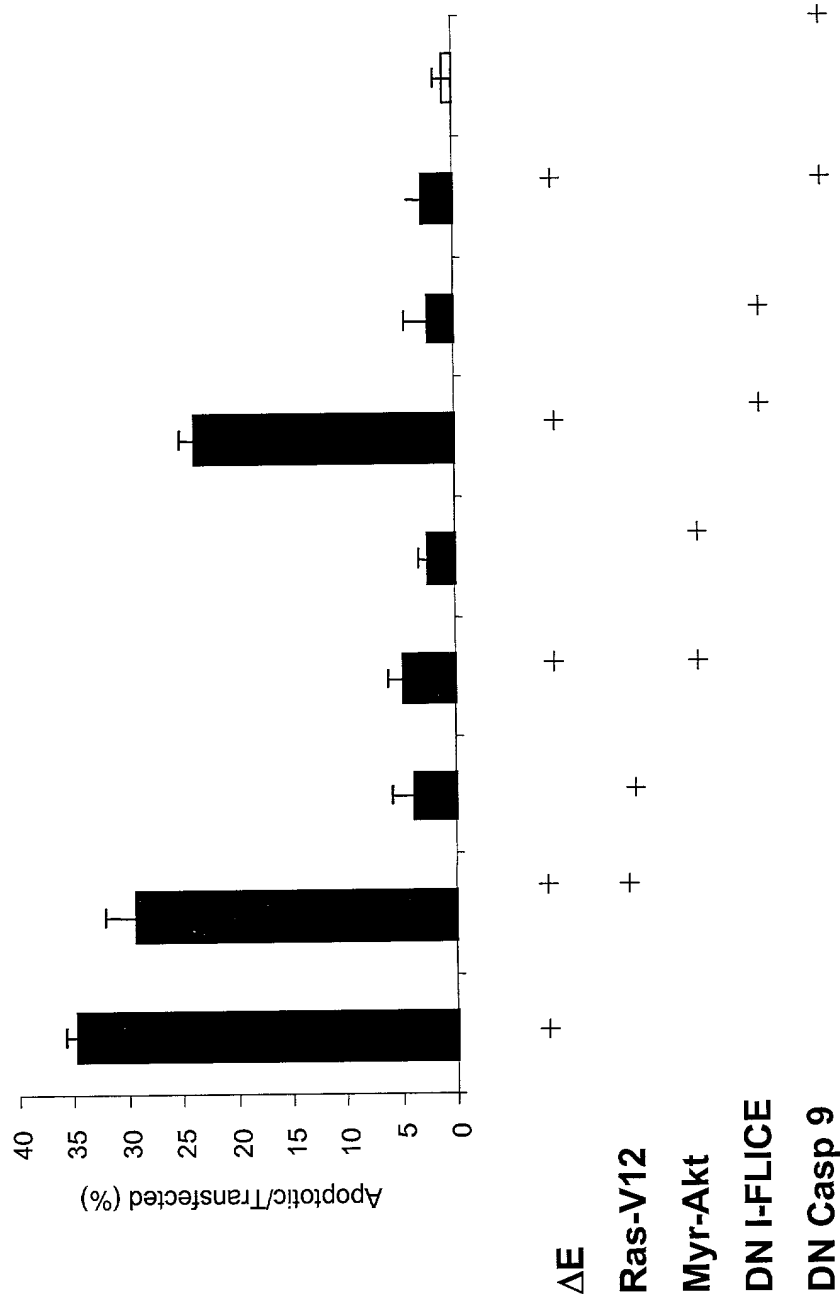
Figure 12

# Rescue of apoptosis caused by ΔE with FLHIP1



18 h post-transfection

# Rescue only with Akt/Dncasp9

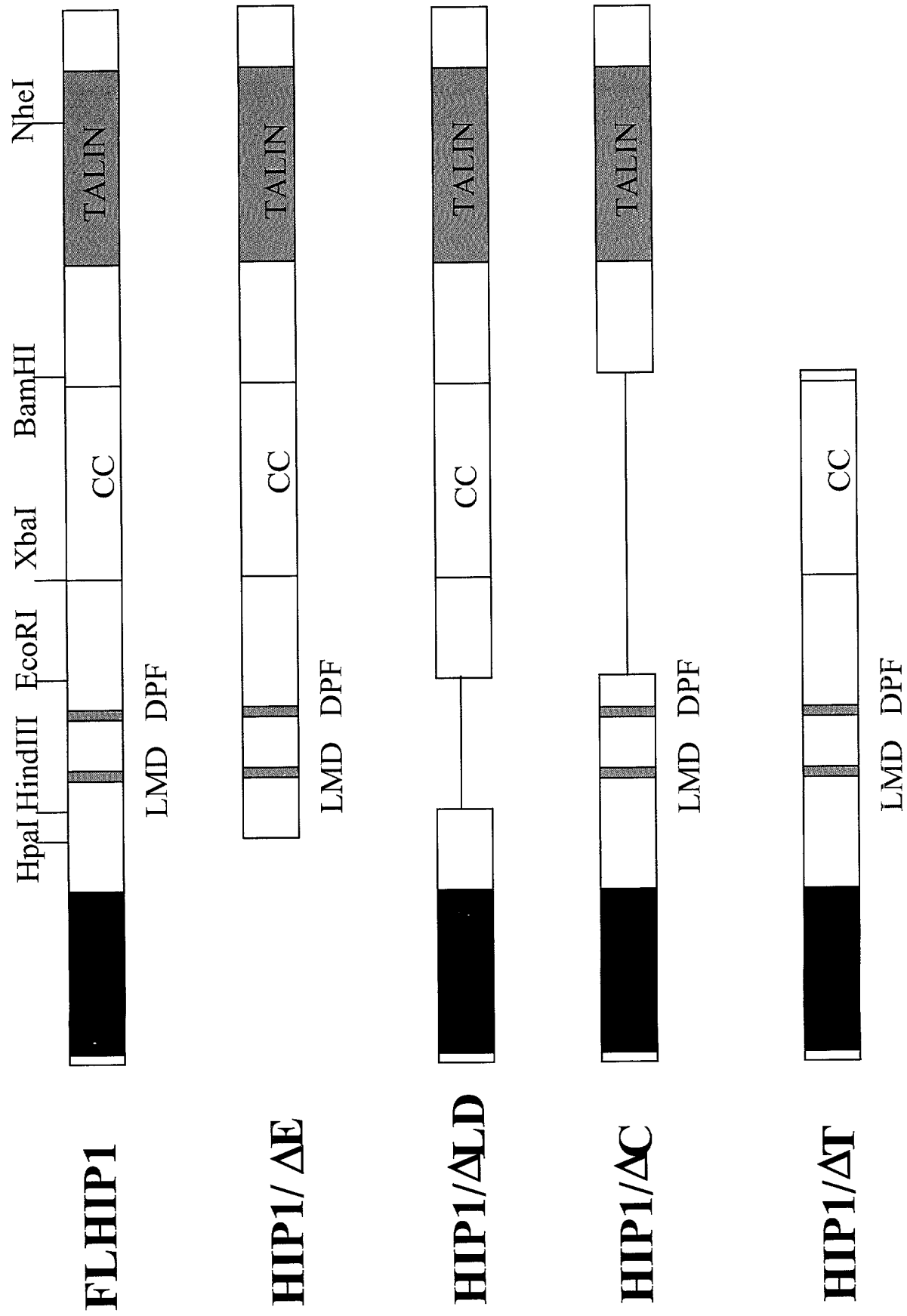




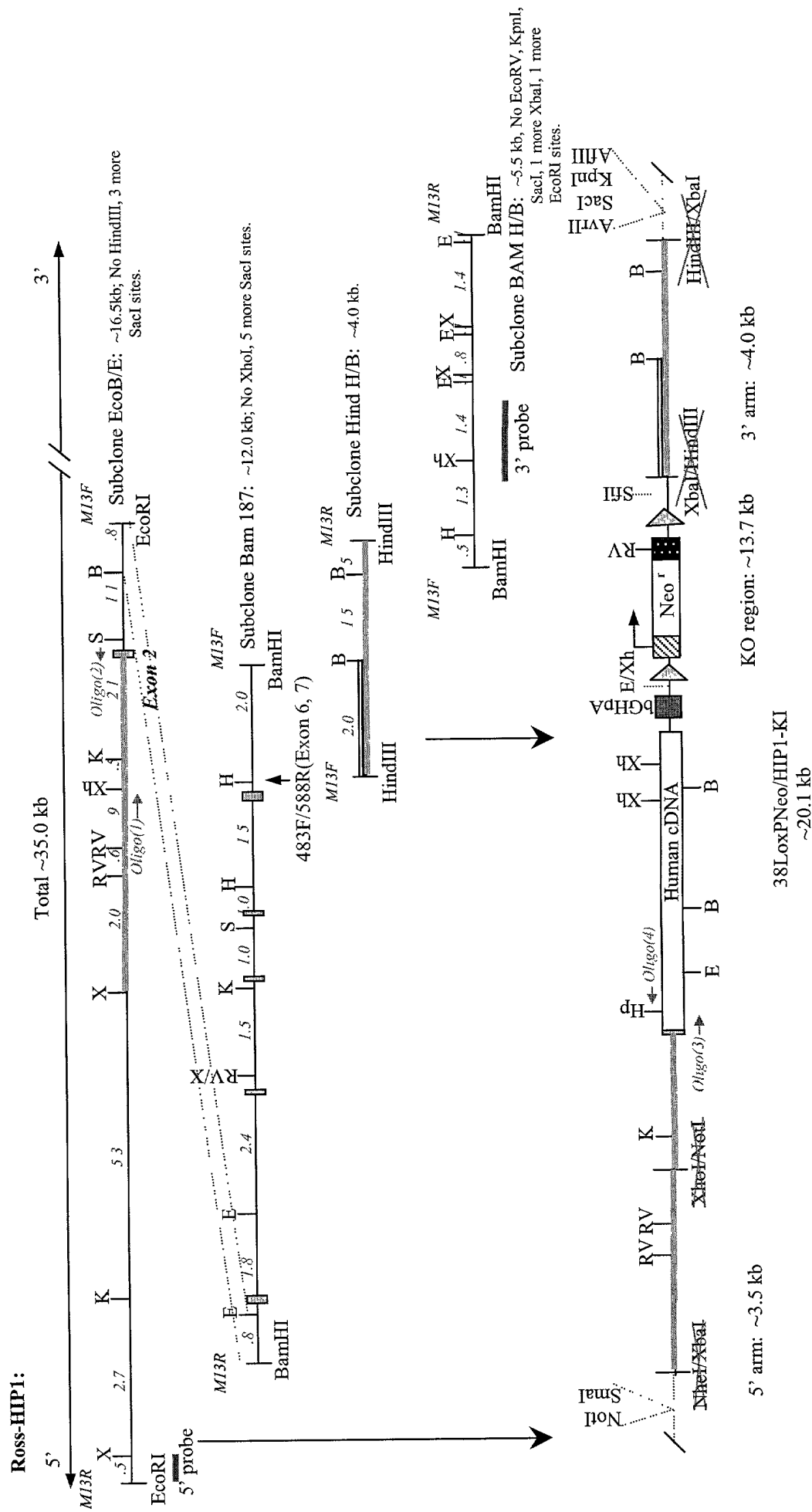
tl

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Figure 14



# Vector Construction Strategy for HIP1/PDGFβR knock-in



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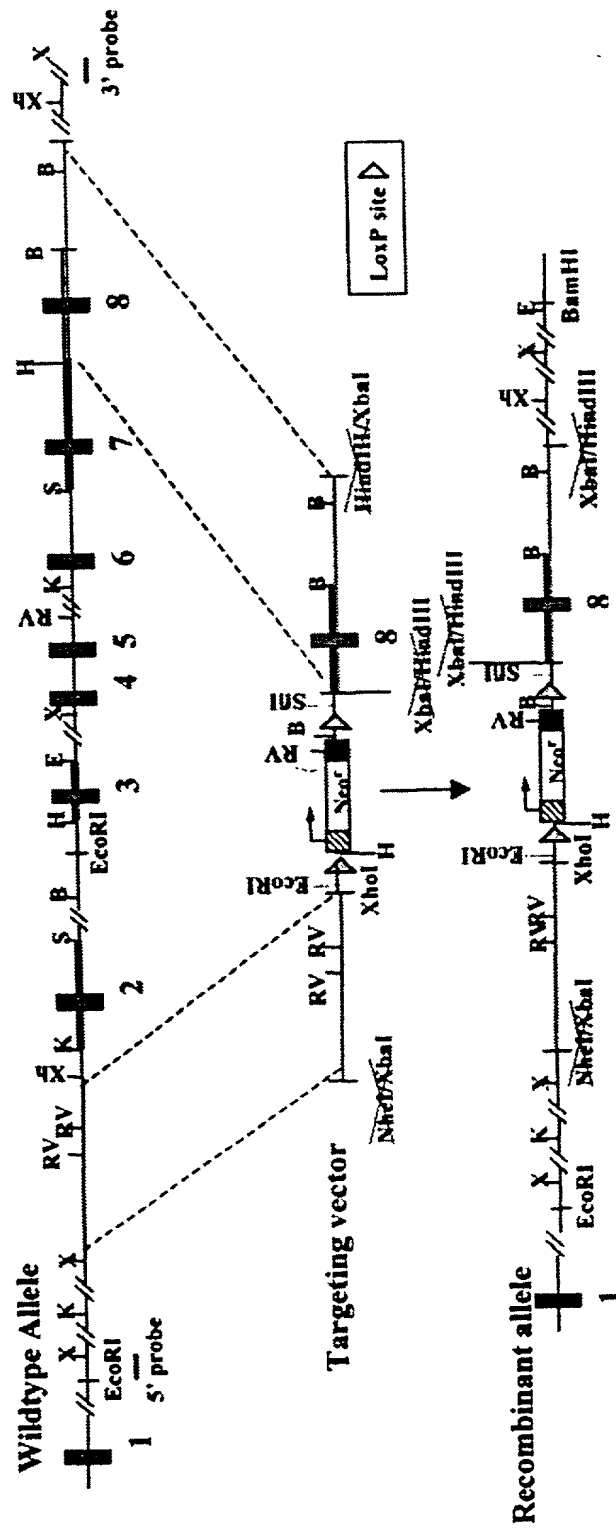


# Figure 17

-173 GGGCCGAGCCAGCGGAGGGGCTCCTGAAGGGGCGGGGGCGGGCGGGGAAGCCGT  
 -119 TCGGCGAGGGGCGGGTCTCTGGAAGACTGGCAGAACTCACAGCCAATGGCAGGC  
 -64 GGGAGCCGTCCCGTTAGCGCCGGATCCCCGCGGGTAGGGCGGGGCGGGCGGGCGCC  
 -10 GTGGGGATCC  
 exon 1 0 CGGGGCAGCCGAGGGCCCCTGACTCGGCTCCTCGCGGCGACATGGATCGGATGGCCA  
 57 GCTCCATGAAGCAGGTGCCCAACCCACTGCCCAAGGTGCTGAGCCGGCGCGGGGTCC  
 114 GCGCTGGGCTGGAGGCGGCGGAGCGCGAGAGCTTCGAGCGGAC TCAGGT.....  
 .....TCAG  
 exon 2 161 ACTGTCAGCATCAATAAGGCCATTAATACGCAGGAAAGTGGCTGTAAAGGAAAAACATGCC  
 222 AG

20

Figure 18



el

